### HEALTH POLICY BRIEF

RHODE ISLAND DEPARTMENT OF HEALTH

# Rhode Island Obesity Control Program: A Public Health Approach to Addressing Overweight and Obesity Among Children and Adults

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Safe and Healthy Lives in Safe and Healthy
Communities

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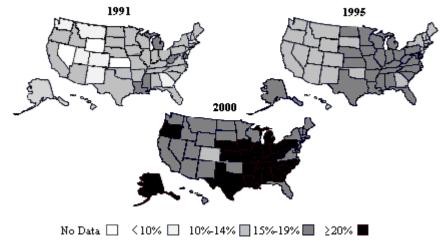
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#### Introduction

Overweight and obesity occurs when more calories from food (energy) are consumed than expended or burned, resulting in excessive body fat. The health consequences of overweight and obesity are a serious problem, affecting both the quality and quantity of life (Table 1).

Figure 1. Obesity\* Trends among U.S. Adults, 1991, 1995, and 2000 from the Behavioral Risk Factor Surveillance System (BRFSS)

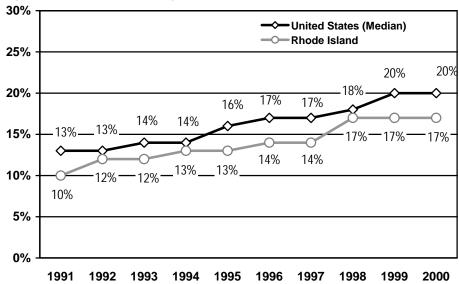


Source: Mokdad AH, et.al. J. Am. Med. Assoc. 1999;282:16, 2001;286:10. (Centers for Disease Control and Prevention)

The United States is experiencing unprecedented increases in overweight and obesity. These increases cut across all ages, all racial and ethnic groups, and both genders.<sup>2</sup> Overweight and obesity have reached "epidemic" proportions in the United States. If this trend is not reversed, obesity-related health problems and associated costs will soon surpass those associated with tobacco.<sup>3</sup> In 1991 no state had an obesity rate of 20% or higher. By 2000, 22 states reported obesity rates of 20% or higher (Figure 1).<sup>2</sup>

## The adult obese population in Rhode Island has almost doubled in the past 10 years.



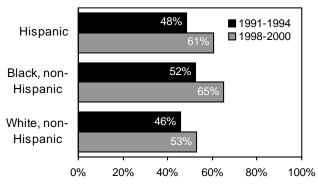


Rhode Island trends in obesity closely parallel the nation's. In 2000, 17% of RI adults and 20% of adults nationally were obese, up from 10% of Rhode Islanders in 1991 and 13% of adults nationally (Figure 2).

<sup>\*</sup> The complete definition of overweight and obesity is provided on page 4.

### Overweight and obesity rates differ among racial/ ethnic groups in Rhode Island.

Figure 3. Percent of Rhode Island Adults, Ages 18+, Who Are Overweight or Obese by Race/Ethnicity, 1991-1994 and 1998-2000 (BRFSS)



Rhode Island Hispanics have experienced the sharpest relative increase in overweight and obesity, from 48% in 1991-1994 to 61% in 1998-2000. Over this time period, the prevalence of overweight and obesity among Black adults has been consistently higher than for Hispanic or White adults (Figure 3).

Racial/ethnic minority adults face well-documented disparities in quality and years of healthy life.<sup>3</sup> Racial/ethnic minority children are more likely to be overweight and obese than their white

counterparts.<sup>4,5</sup> If current trends continue, the obesity epidemic among racial/ethnic minorities will widen disparities in health status.

# Obesity is responsible for costly long-term health consequences among children and adults.

Table 1. Health Consequences of Overweight and Obesity for Children and Adults

#### **Health Consequences Among Children**

#### **Health Consequences Among Adults**

- Sixty percent of obese children (ages 5-10 years) already have at least one cardiovascular disease risk factor.<sup>6</sup>
- Obese children are at added risk for developing type 2 diabetes, high blood pressure, hypertension, and orthopedic problems.<sup>3,7</sup>
- Overweight adolescents are more likely to become overweight or obese adults.8
- Overweight and obese adults have increased health risks and higher health care costs than those at a healthy weight.9
- Overweight and obese adults are at increased risk for early onset of chronic diseases (type 2 diabetes, heart disease, stroke, and some forms of cancer).<sup>1,3,10</sup>
- Obese adults are at higher risk for musculoskeletal disorders, work disability, and sleep apnea.9

# Rhode Island has set an agenda to address the obesity epidemic.

In 2000-2001, the US Centers for Disease Control and Prevention funded Rhode Island and 11 other states to develop statewide nutrition and physical activity plans and programs to reduce the prevalence of obesity. The Rhode Island Obesity Control Program at the Rhode Island Department of Health (HEALTH) has made elementary

school children and their families a top priority, with a special focus on Hispanic children. HEALTH's response is centered on activities and interventions in three key areas: data, planning, and prevention (Table 2).

Table 2. Three Key Areas to Address Overweight and Obesity in Rhode Island

Data	Planning	Prevention
Survey RI elementary schools to identify current school-based environmental strategies, policies and programs for obesity	Develop a statewide 5-year plan with community partners to reverse obesity trends.	➤ Develop and evaluate environmental and policy interventions to support physical activity and healthy
prevention.  >Analyze Rhode Island Behavioral	➤ Incorporate relevant Healthy People 2010 and	eating in RI elementary schools.
Risk Factor Surveillance System, Youth Risk Behavior Survey, and other HEALTH data to monitor	Healthy Rhode Islanders 2010 objectives on nutrition and physical activity into RI	➤ Work with non-profit and for- profit partners to promote eating a healthy diet and
other HEALTH data to monitor obesity trends.	physical activity into RI Obesity Control Program.	eating a healthy diet an staying active for life.

#### \*Measuring Overweight and Obesity

Body Mass Index (BMI) is used for defining overweight and obesity and is calculated from a person's height and weight. For example a person who is 5'4" tall is overweight at 146 lbs and is obese at 175 lbs (see table below). Overweight adults have a BMI between 25.0 and 29.9. Obese adults have a BMI of 30 or higher. In children and adolescents overweight is defined as a sex- and age specific BMI at or above the 95th percentile based on US Centers for Disease Control and Prevention revised growth charts. This definition includes obesity. The CDC website has a page for calculating BMI for adults (http://www.cdc.gov/nccdphp/dnpa/bmi/bmi-adult.htm) and for children (http://www.cdc.gov/nccdphp/dnpa/bmi/bmi-for-age.htm).

If you are this tall-	You are overweight at-	You are obese at-
5 ' 0"	128 lbs.	154 lbs.
5'2"	137 lbs.	164 lbs.
5'4"	146 lbs.	175 lbs.
5'6"	155 lbs.	186 lbs.
5'8"	165 lbs.	197 lbs.
5 ' 10 "	174 lbs.	208 lbs.
6'0"	185 lbs.	221 lbs.

#### Rhode Island Behavioral Risk Factor Surveillance System

The Rhode Island Behavioral Risk Factor Surveillance System (RI BRFSS) is a telephone survey of a representative sample of Rhode Island adults (ages 18 years and older). The survey has been performed annually since 1984 with funding from the federal Centers for Disease Control and Prevention (CDC), the lead agency responsible for national BRFSS estimates. Sampling and telephone interviewing are done by a professional survey organization under contract to HEALTH, with a sample size of 3,544 respondents in 2000. Data from the 2000 RI BRFSS are available on the OHS website: <a href="http://www.healthri.org/chic/statistics/brsf2000.pdf">http://www.healthri.org/chic/statistics/brsf2000.pdf</a>

For more information on the national BRFSS, visit the CDC BRFSS website: http://www.cdc.gov/nccdphp/brfss



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Rhode Island Department of Health

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<sup>2</sup> Mokdad AH et al. The Spread of the Obesity Epidemic in the United States, 1991-1998. JAMA.1999;282:1519-22.

<sup>3</sup> US Department of Health and Human Services, Public Health Service, Office of the Surgeon General. The Surgeon General's Call to Action to Prevent and Decrease Overweight and Obesity 2001. Available from: <a href="http://www.surgeongeneral.gov/topics/obesity/">http://www.surgeongeneral.gov/topics/obesity/</a>

<sup>4</sup> Strauss et al. Epidemic Increase in Childhood Overweight, 1986-1998. JAMA. 2001;286:2845-8.

<sup>5</sup> Crawford PB, et al. Ethnic Issues in the Epidemiology of Childhood Obesity. Pediatr Clin North Am. 2001;48:855-78.

<sup>6</sup> Freedman DS, et al. The Relation of Overweight to Cardiovascular Risk Factors Among Children and Adolescents: The Bogalusa Heart Study. Pediatrics. 1999;103:1175-82.

<sup>7</sup> Deckelbaum RJ et al. Childhood Obesity: The Health Issue. Obesity Research. 2001;9:(Supplement 4)239-43.

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<sup>10</sup> Visscher TLS and Seidell JC. The Public Health Impact of Obesity. In JE Fielding et al. (eds). Annual Review of Public Health Vol. 22, 2001.

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